AMENDMENTS TO THE SPECIFICATION

Replace the Paragraph beginning at Page 2, line 8, with the following replacement paragraph:

The EIGRP protocol specifies that each link for a corresponding destination specified in a routing table of a given router can have one of two possible states, mainly "Active" and "Passive". The "Active" state refers to a state when a link is not available (e.g., when a link failure occurs), at which point the router is "actively" attempting to identify from its topology a feasible successor to reach the destination. The "Passive" state refers to a state where the router is "passive" (i.e., does not need to identify a feasible successor) because the topology table already identifies an available link (i.e., a link that can reach the destination within prescribed cost parameters). Routers can generate update messages in response to: (1) receiving an update message from another router, and entering an "Active" phase to identify a feasible successor; or (2) detecting a transition in a link due to either [[an]] a link failure (i.e., available link transitions to an unavailable link), or a link recovery (i.e., an unavailable link transitions to an available link).

Replace the Paragraph beginning at Page 6, line 2, with the following replacement paragraph:

Hence, the router 12b, in response to aggregating the attributes of the links 16a and 16b to form the combined dynamic attributes of the active path 34a, updates its internal topology tables and routing tables as described below, and outputs [[and]] an EIGRP update message to the router 12c that specifies the change in the attributes for the active path 34a connected to the router 12b. In particular, since the aggregate bandwidth of the connected active path 34a is 125 Mb/s (50 Mb/s of link 16a plus 75 Mb/s of link 16b), the router 12b will send an EIGRP update message to the router 12c specifying that the destination 14 (or at least an IP address prefix that includes the destination 14) is reachable with a bandwidth of 125 Mb/s.

Replace the Paragraph beginning at Page 9, line 2, with the following replacement paragraph:

As illustrated in Figure 7, the topology information is stored in the topology table 50 based on a destination 52: each destination will list all the paths 34 to that destination, where each path is identified by an interface identifier 60 and a next hop router 56 (e.g., by its IP address). Hence, the router 12b will ~~include~~ specify in its topology table 50 ~~will specify~~ a destination 14 (D) having two sub-entries, namely a first entry 80a specifying the destination 14 is reachable via next-hop router 12a (R1) using interface link 16a, and a second entry 80b specifying the destination 14 is reachable via next-hop router 12a (R1) using interface link 16b. The routing table 46 for the router 12b also will include the two entries specifying the destination 14 (D) is reachable via next-hop router 12a (R1) using interface links 12a and 12b, respectively.

Replace the Paragraph beginning at Page 10, line 9, with the following replacement paragraph:

The Link Aggregation Module 42 of Figure [[2]] 4, also referred to as a link associating resource, is configured for associating connected links 16 with a given path 34. In particular, the link aggregation module 42 is configured for combining the resources of individual links 16 into a logical path 34, illustrated in Figure 1. The link aggregation module 42 is configured for recognizing the links 16 connected to the router 12; the link aggregation module 42 monitors EIGRP-based update messages from a given destination (e.g., another router) via a given link (e.g,. 16a). Hence, if the link aggregation module 42 determines that the same destination (e.g., the router 12a) is reachable via more than one link (e.g, link 16a and link 16b), and the link aggregation module 42 determines that the links 16a and 16b providing reachability for that same destination are configured for load-sharing, the link aggregation module 42 associates the two links 16a and 16b with the same destination (e.g, the router 12a), and aggregates the appropriate metrics (such as bandwidth) and load.

Replace the Paragraph beginning at Page 12, line 1, with the following replacement paragraph:

The Transport Module 32 is configured for parsing received TLV messages recovered from the protocol dependent module 30. In particular, the protocol dependent module 30 is configured for receiving a protocol-specific update message from a peer router, removing the protocol-specific network layer header, and providing the remaining TLV portion of the message to the ~~protocol dependent module 30~~ transport module 32.

Replace the Paragraph beginning at Page 13, line 22, with the following replacement paragraph:

The monitoring resource 38 concurrently determines in step 216 if a metric change is detected, for example by monitoring the interface driver 22 and the delay measurement resource 26. The monitoring resource 38, in response to detecting ~~eight~~ a metric change, updates the topology and routing tables in step 212.